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August 17, 2012

To: Supervisor Zev Yaroslavsky, Chairman
Supervisor Gloria Molina
Supervisor Mark Ridley-Thomas
Supervisor Don Knabe
Supervisor Michael D. Antonovich

From: William T Fujioka
Chief Executive Officer

UPDATE ON HAULED WATER REPORT – RESPONSE TO PUBLIC INPUT AT COMMUNITY OUTREACH MEETINGS

On November 3, 2009, on motion by Supervisor Antonovich, the Board directed the Chief Executive Officer (CEO) to: work with the Hauled Water Task Force (Task Force) to prepare a public presentation concerning the findings contained in the September 17, 2009, Report on the Feasibility of Using Hauled Water for New Residential Construction in Select Areas of the County (Attachment I); engage the Task Force to conduct a series of community outreach meetings regarding this report, starting in early 2010; ensure that this public outreach consists of three duly-noticed public meetings in Acton, Agua Dulce, and Juniper Hills, as well as a fourth meeting before a regular meeting of the Association of Rural Town Councils; and to report back in writing within 30 days of the last community meeting outlining the public input on this matter.

This report serves as the written report back to the Board: (1) summarizing the Task Force's responses to the public on the use of hauled water; (2) setting forth updates and modifications to the "hauled water policy" outlined in the September 17, 2009, report; (3) explaining changes to the Position Statement; and (4) reporting on State fire sprinkler systems and well production requirements as applied to the use of hauled water. It is noted, however, that this report serves only to supplement and amend the scope of the potential policy outlined in the September 17, 2009, report, and does not supersede the review, analysis and risks identified in the 2009 report.

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Background

At the Board's request, the CEO convened meetings from representatives of the Departments of Public Health, Public Works, Regional Planning, Fire, and County Counsel to study issues concerning the use of hauled water in certain parts of the County. The Hauled Water Task Force worked for several years on developing the report and, on September 17, 2009, the CEO provided the Board with the Report on the Feasibility of Using Hauled Water for New Residential Construction in Select Areas of the County. The report summarized the findings of the Task Force's review and evaluation of the County's current policy on the use of hauled water, and presented potential changes to the policy for the Board's consideration.

Specifically, the September 17, 2009, report outlined for the Board's consideration a potential policy change to allow the use of hauled water on *"existing legal lots, or lots that are eligible for a certificate of compliance issued by Regional Planning (excluding lots in those areas that are designated 'very high fire hazard severity zones' in the Malibu/Santa Monica Mountains/south facing San Gabriel Mountains), where the property owner has demonstrated that there is no other feasible potential source of municipal or onsite well water available to the property."*

Also provided to the Board in connection with the September 17, 2009 report was a Position Statement on the Use of Hauled Water for Domestic Purposes (Position Statement), which was prepared by the Department of Public Health (Public Health). The Position Statement summarized Public Health's position on the use of hauled water (1) for domestic purposes following an emergency or when private wells go dry, and (2) as a primary source of residential water supply for new construction of single family residences, should the County decide to allow such use. The Health Officer also collaborated with the Task Force to develop criteria necessary to ensure water potability and to reduce the public health risks associated with hauled water.

As directed in the Board's November 3, 2009 motion, the CEO convened meetings with the Task Force members to engage them in developing a community outreach plan. The Task Force held outreach meetings in the communities of Juniper Hills, Lancaster, and Acton on June 2, 10, and 15, 2010, respectively, to solicit the community comments on the report. The Task Force also encouraged members of the public to submit additional questions and comments outside of the meeting format and agreed to provide written responses to those questions and comments.

On August 13, 2010, the CEO provided the Board with a report concerning the public input at community outreach meetings and the Task Force's efforts to respond to community questions and address community concerns. In that report, we indicated that we would provide a Summary Input Report following the completion of the community open comment and response period, in which we would document community input, as well as address changes in State law regarding fire sprinkler systems and well production requirements, which were issues raised at community meetings.

Summary of Public Input and the Task Force's Response

Between August 2010 and February 2012, the Task Force worked closely with Town Council Presidents and other key community leaders, and conducted a series of follow-up meetings to obtain their feedback and to ensure their questions, comments, and concerns were fully and accurately addressed. Additionally, there were in-depth discussions within the Task Force and with staff from the subject departments to consider the various legal and practical considerations concerning the use of hauled water, both for new construction and for existing homes.

In February 2012, the Task Force released the Response to Public Comments on the Use of Hauled Water (Attachment II). This document: (1) formalizes the Summary Input Report as promised to the Board, and noted in the CEO's August 13, 2010 memorandum; and (2) summarizes the input received from the public and responses provided by the Task Force. Subsequently, public meetings were held by the Town Councils in the Fifth Supervisorial District (Fifth District) communities of Juniper Hills, Lancaster, and Acton, and with the Association of Rural Town Councils, to update the public on the Task Force responses. The Fifth District Board Deputies were present at these meetings and represented the Task Force on the discussions with the community in order to facilitate the public's submission of additional input for further consideration in the final response document.

The comments and questions received during the community outreach meetings, and the Task Force's responses thereto, are provided in more detail in the response document, and categorized under the following five headings:

- Existing Homeowners Using Hauled Water;
- Proposed [Potential] Use of Hauled Water for New Development;
- State-approved Potable Water Haulers;
- Process and Timeline for Proposed Change in Policy;
- Addendum; and
- Miscellaneous

As part of the continued community outreach efforts, the Task Force will keep the community informed of any revisions and recommendations related to the County's policy on the use of hauled water.

Summary of Updates and Modifications to the Potential Hauled Water Policy

Based on the input received from residents at the community outreach meetings, and after considering other potential impacts on the use of hauled water, the Task Force has made changes to the "hauled water policy" outlined in the September 17, 2009, report.

As explained above, the September 17, 2009, report summarized a "hauled water policy" allowing the use of hauled water for new development *on existing legal lots, or lots that are eligible for a certificate of compliance issued by Regional Planning (excluding lots in those areas that are designated "very high fire hazard severity zones" in the Malibu/Santa Monica Mountains/south facing San Gabriel Mountains), where the property owner has demonstrated that there is no other feasible potential source of municipal or onsite well water available to the property.*

The current policy would allow the use of hauled water for new development *on existing legal lots, or lots that are eligible for a certificate of compliance issued by Regional Planning, where the property owner has demonstrated that there is no other feasible potential source of municipal or onsite well water available to the property, and only if the property lies outside of the boundaries of both a municipal water district and a public-community water purveyor as of the date the County issues a Notice of Preparation for an Environmental Impact Report (EIR) or, if no EIR is prepared, on the date the County either issues the draft Negative Declaration or Notice of Exemption in preparation for consideration of a County ordinance or policy authorizing hauled water within the County.*

This revised "hauled water policy" is also subject to the following changes:

- First, the revised "hauled water policy" will only apply to the use of hauled water for new development. The revised policy will not affect homeowners who are now utilizing hauled water. For the use of hauled water for new development, all such property owners must agree to comply with the requirements and guidelines established by the County and the Health Officer for the use of hauled water.
- Second, the requirement that a homeowner utilizing hauled water obtain an annual use permit and submit to an annual inspection has been eliminated from the revised "hauled water policy."

Summary of Modifications to the Position Statement

Also based on community input and the consideration of other potential impacts on the use of hauled water, Public Health has revised its Position Statement, Position on the Use of Hauled Water for Domestic Purposes (Attachment III). The new language of the Position Statement, as well as an explanation of relevant changes, is as follows:

Use of Hauled Water for Emergencies or When Wells Go Dry: The use of hauled water is often necessary following an emergency when municipal or private potable water supplies have been interrupted (e.g., fires, earthquakes, or other natural disasters) or when private wells go dry or seasonally dry. Under these circumstances, hauled water is allowed. However, Public Health advises property owners that the risks associated with the use of hauled water can be mitigated by the following actions:

- 1. The property owner should contract with a State-licensed potable water hauler;*
- 2. The property should be equipped with a storage tank, plumbing connections, and method of disinfection, which have been approved by the Department; and*
- 3. The property owner is to ensure proper operation and maintenance of the system.*

The second and third requirements above have been added for the use of hauled water for emergencies or when wells go dry. The following requirements have been eliminated for the use of hauled water for emergencies or when wells go dry: (1) the requirement that the property owner ensure that the water hauler is able to provide the necessary documentation to certify that the water is supplied from a State-permitted source; (2) the requirement that the property owner provide evidence that hauled water facilities are code-compliant upon sale, transfer, or major renovation of the property; (3) the requirement that the property owner agree to comply with Public Health's guidelines regarding the operation and maintenance of the hauled water system; and (4) the requirement that the property owner acknowledge the potential consequences associated with the use of hauled water. Additionally, the former requirement that "[t]he property owner must contract with a State-licensed potable water hauler" has been amended to read that "[t]he property owner should contract with a State-licensed potable water hauler."

Use of Hauled Water as a Potential Source of Water for New Development: In anticipation that the County might allow such construction, the Health Officer has collaborated with the Task Force in developing the following criteria necessary to ensure water potability and to reduce the risks associated with hauled water:

1. *The property owner must contract with a State licensed potable water hauler;*
2. *The property must be equipped with a storage tank, plumbing connections, and method of disinfection, which have been approved by the Department;*
3. *The property owner acknowledges receipt of the Department's recommended methods to minimize the risks associated with the use of hauled water, and the possible reduction in the future availability of hauled water due to water shortages or rising costs, and agrees to comply with the Department's requirement for operation and maintenance of the system; and*
4. *The property owner must record a Covenant to ensure that any future owners, encumbrances, their successors, heirs or assignees are aware that hauled water is the primary source of potable water for the property.*

The fourth requirement above has been added for the use of hauled water as a potential source of water for new development. The requirement that the property owner ensure that the water hauler is able to provide the necessary documentation to certify that the water is supplied from a State-permitted source has been eliminated for the use of hauled water as a potential source of water for new development.

Report on State Fire Sprinkler Systems and Well Production Requirements as Applied to Hauled Water

Fire Sprinkler Systems

With regard to the issue raised by the community of the new State law/requirements for Fire Sprinkler Systems, the Task Force researched this matter in order to determine the impact this would have, if any, on the County's hauled water policy. The Task Force further determined the State law that requires interior fire sprinklers for "all" new residential construction, regardless of whether the new construction is located in a high fire hazard severity zone, has no bearing on the potential use of hauled water.

Well Production

The Task Force reviewed the County's well production requirements for a low yield well in support of new development. Based on this review, if a well has insufficient onsite water available (the well yield does not provide a minimum of three gallons per minute, or two gallons per minute with an additional 1,500 gallon storage tank capacity), and the property lies outside of the boundaries of a municipal water district or public-community water purveyor, the property owner may be approved to use hauled water to

supplement the low yield well for the purpose of obtaining a building permit. If the well meets the well production requirement, property owners will be required to use well water as the sole source of potable water.

Public Health continues to confer with its Technical Advisory Committee in consideration of the public feedback, to determine if it is feasible to reduce the minimum production yield requirement or if other alternatives are available.

NEXT STEPS

As noted in our September 17, 2009 report, if the Board determines to direct staff to move forward with changing the County's current policy regarding the use of hauled water, the Board would need to take the following steps:

- Identify funding and direct the Task Force to develop a work program, outreach plan, and estimated timeline for the issuance of a Requests For Proposal for purposes of retaining a consultant to prepare an initial study, and, if necessary, an Environmental Impact Report (EIR) on the draft single family residential hauled water policy, which is in compliance with the California Environmental Quality Act (CEQA) Guidelines. If the initial study determines that an EIR is required, the preliminary estimated cost of preparing the EIR, including the initial study, is \$500,000, and the estimated time to prepare is 18 to 24 months.
- Direct County Counsel, in consultation with other members of the Task Force, to draft a proposed ordinance for the Board's consideration that amends applicable Los Angeles County Codes to provide for a single family residential hauled water use policy which incorporates the provisions previously outlined, and in the Response to Public Comments document, subject to any amendments made by the Board, and as informed by the required CEQA analysis.

Each Supervisor
August 17, 2012
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If you have any questions or need additional information, please contact Rita Robinson at (213) 893-2477, or rrobinson@ceo.lacounty.gov, or Sheila Shima at (213) 974-1160, or sshima@ceo.lacounty.gov.

WTF:RLR:SAS
AMT:RFM:os

Attachments (3)

c: Executive Office, Board of Supervisors
County Counsel
Fire
Public Health
Public Works
Regional Planning

ATTACHMENT I



WILLIAM T FUJIOKA
Chief Executive Officer


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September 17, 2009

To: Supervisor Don Knabe, Chairman
Supervisor Gloria Molina
Supervisor Mark Ridley-Thomas
Supervisor Zev Yaroslavsky
Supervisor Michael D. Antonovich

From: 
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Chief Executive Officer

Jonathan E. Fielding, M.D., M.P.H. 
Director and Health Officer of Public Health

Gail Farber 
Director of Public Works

Jon Sanabria 
Acting Director of Planning

Board of Supervisors
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**REPORT ON THE FEASIBILITY OF USING HAULED WATER FOR NEW
RESIDENTIAL CONSTRUCTION IN SELECT AREAS OF THE COUNTY**

Background

On July 22, 2003, on a motion by Supervisor Antonovich, the Departments of Public Health (DPH), Public Works (Public Works), and Regional Planning (Planning) were directed to prepare a report on the advisability of reevaluating the DPH Water Availability Requirements, which includes a determination that "hailed water" is not a reliable source of potable water, as defined in the Los Angeles County Code – Title 28 - Plumbing. The existing Water Availability Requirements preclude new development on private property where neither municipal water nor onsite well water is available.

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The Water Availability Requirements were issued on January 1, 2003 following a September 2002 letter from the State Department of Public Health and the California Conference of Directors of Environmental Health (CCDEH), advising against the use of "hailed water" in support of new development, and requesting county planning agencies to eliminate this practice. In October 2005, Los Angeles County Code - Title 11 was amended to effectively preclude new development where neither a municipal water supply nor onsite well water are available, and to further incorporate the policy changes established by DPH in 2003.

Public Health Considerations on Water Availability

From a public health perspective, the determination of water availability requires an analysis of both quantity and quality. It is vital that sources of potable water for domestic use meet the established chemical and bacteriological drinking water standards, and that the water source is sustainable. These criteria for *water quality* and *long-term sustainability* are essential in assuring a safe water supply that is protective of public health.

Historically, the most desirable and protected source of domestic water is from a municipal water system, which has proven to provide high quality and a sustainable supply. Where municipal systems do not currently exist, individual water supply wells that are routinely monitored and maintained may provide an alternative source of water that meet established criteria for quality and quantity. While hailed water approaches can be configured and engineered to meet quantity and quality standards, these approaches carry many more inherent problems than other water supply methods. Experience has shown the use of hailed water to be problematic from a quality and sustainability perspective. The problems associated with hailed water are described subsequently in this document under "Risk Analysis of the Use of Hailed Water".

Despite the inherent problems associated with the use of hailed water, there is a benefit to evaluating these problems, and considering protective measures that could be implemented to mitigate the risks. In the County of Los Angeles, there are an estimated 3,000 - 4,000 home sites currently relying on hailed water to meet their domestic supply needs. Identifying ways to make hailed water a more reliable source would directly benefit the health and safety of these "existing users."

County Review of Hauled Water Policy

In early 2008, at the request of Supervisor Antonovich's office to expedite a response to the July 23, 2003 Board request for a report on the advisability of reevaluating the DPH Water Availability Requirements, the CEO convened a series of Work Group meetings with DPH, DPW, Planning, Fire, and County Counsel to review and evaluate the County's current policy on the use of "hauled water", and to develop potential changes for the Board's consideration.

County departments involved in the policy review and evaluation process and their roles are as follows:

1. Chief Executive Officer: facilitator.
2. County Counsel: legal research, advice, and assistance regarding State and Federal laws and regulations, environmental and programmatic issues including criteria for geographic areas to be considered, and preparation of draft documents including a potential ordinance.
3. Department of Public Health: research, analysis, and assessment of risks associated with the use of "hauled water;" and preparation of a position statement on protocols and processes necessary to reduce the risks associated with the use of "hauled water."
4. Department of Public Works: provide information on public and community water purveyors within defined geographical area; assistance in development of criteria for defining applicable geographical areas; and work with DPH on preliminary implementation protocols and processes.
5. Department of Regional Planning: assistance in evaluating whether hauled water is a land use and/or public health and safety issue; with input from task force members, develop criteria for defining geographical areas in which the use of hauled water may be approved; map geographical areas based upon defined criteria; and evaluate need, scope and estimated cost for preparation of an environmental document.
6. Fire Department: assistance in defining criteria for geographic areas to be subject to any revisions to the Water Availability Requirements.

Staff from the foregoing departments worked together to consider the various legal and practical considerations concerning the use of hauled water, both for new construction and for existing homes. Legal considerations include State and Federal law and regulations governing water haulers and their sources, as well as guidance provided by State and Federal agencies. Practical considerations include availability and sustainability of hauled water as a consistent water source, health considerations associated with the use of hauled water, increased fire risk, and difficulties in enforcement.

Staff also researched the extent to which other public entities throughout the nation permit the use of hauled water as a domestic water source and the conditions that these jurisdictions impose upon the use of hauled water.

Based on the foregoing policy review, the Work Group developed a *Position Statement on the Use of Hauled Water for Domestic Purposes* (Attachment I). The Position Statement indicates that the use of "hauled water" is often necessary following an emergency when municipal or private potable water supplies have been interrupted (e.g., fires, earthquakes, or other natural disasters), or when private wells go permanently or seasonally dry due to drought conditions or changes in groundwater availability.

The Position Statement also addresses the potential that the County may consider the use of "hauled water" as a single family residential water supply option for new construction on *"existing legal lots, or lots that are eligible for a certificate of compliance issued by Regional Planning (excluding lots in those areas that are designated "very high fire hazard severity zones in the Malibu/Santa Monica Mountains and South Face of the San Gabriel Mountains), where the property owner has demonstrated that there is no other feasible, potential source of municipal or onsite well water available to the property."* In anticipation that the County might allow such construction, the Health Officer has collaborated with the Work Group in developing the following criteria necessary to ensure water potability and further reduce the inherent risks associated with hauled water:

1. The property owner must contract with a State-licensed potable water hauler;
2. The property owner must ensure that the water hauler is able to provide the necessary documentation, certifying that the water was supplied from a State permitted source;

3. The property must be equipped with a code-compliant storage tank and plumbing connections approved by Fire and DPW, and a disinfection device approved by DPH;
4. The property owner must agree to comply with guidelines regarding the operation and maintenance of the system.

The Work Group considered the need for an ongoing inspection program and renewable operating permit (i.e., yearly or every three years) to ensure long-term compliance with these requirements.

The Work Group also estimated that there are 3,000 to 4,000 existing residential structures already utilizing hauled water for domestic potable water purposes. In order to ensure the safety and potability of hauled water for these existing properties, the Work Group recommends the imposition of similar criteria when undergoing any major renovation requiring a building permit; or within 5 years of the adoption of any ordinance that permits hauled water for newly constructed single family residential purposes, whichever occurs first.

The property owner, in all instances, would be required to acknowledge: (1) the risks of hauled water, including potential health risks, as well as potential reduction in the future availability of hauled water due to water shortages or rising costs; and (2) an understanding of the methods for mitigating these risks.

Key Components of a Potential Hauled Water Program

One of the first steps undertaken by the Work Group was to develop criteria that would define the geographical and developmental type limitations that would be utilized in the County's consideration of any revisions to the current hauled water usage policy. The criteria developed by the Work Group and the reason for the criteria are as follows:

- **County Areas Impacted:** This component included the development of criteria to identify the geographical areas in which hauled water might be approved as a source of potable water for new single family residential development; and mapping such areas of the County. Specifically, the Work Group determined that properties located in the most problematic very high fire hazard severity zones, as defined in the Los Angeles County Fire Code, should be excluded from the potential use of hauled water. The most problematic very high fire hazard severity zones are areas in the Malibu/Santa Monica Mountains and the South face of the San Gabriel Mountains. These areas face a well-documented threat during the Fall fire season as dry north-winds, commonly know as "Santa Ana

Winds", greatly enhance the potential for wind driven conflagrations in these areas. A reliable source of water for firefighting purposes is crucial in these areas, as structures are often remotely located and access is frequently difficult for emergency personnel. The issues of remoteness and difficult access have already prompted the Fire Department to require that indoor sprinkler systems be installed in single-family residences in these areas. Upon exclusion of the most problematic very high fire hazard severity zones, it is estimated that approximately 36,000 lots remain, that may rely upon the use of hauled water as a source of potable water for new single family residential development (Attachments II and III).

- **Non-Geographic Eligibility Criteria/Conditions:** A second component included the development of non-geographic criteria for securing authority to develop property using hauled water. The Work Group determined the following non-geographic criteria constituted important criteria for any potential policy change to allow the use of hauled water to support new development:
 - Parcel must be zoned for single-family residential use. Use of hauled water for multi-family or commercial uses is inappropriate. (Note: The State law contains provisions which allow adult residential facilities, group homes, family child care homes, and farm worker housing by right on parcels zoned for single-family residential uses. These provisions are currently being researched to determine applicability);
 - Parcel must be a lawfully-created parcel on the date the potential new hauled water policy is approved, or on that date the lot must be eligible for a certificate of compliance issued by the Department of Regional Planning. Parcels created by the further subdivision of property following the adoption of the policy will not be eligible;
 - Parcel must be more than 1,500 feet from the existing facilities of a public or community water purveyor, otherwise connection to the water system is deemed feasible;
 - Parcel must be vacant, to accommodate new construction only;
 - Parcel must consist only of slopes less than 50 percent to discourage construction in steep, inaccessible areas;
 - Property owner must demonstrate that parcel cannot be served by a water well that meets County requirements;

- Property owner must record a covenant, binding upon the property owner and future owners, agreeing to comply with all requirements relating to procurement of hauled water and maintaining equipment, and agreeing to indemnify and hold harmless the County from any claims related to the use of hauled water; and
- Single family residential development must comply with all requirements of authority(s) having jurisdiction (including access width, slope, grading, etc.).

Risk Analysis of the Use of Hauled Water

In considering a potential change in the current policy, the Work Group believes it is important for the Board to understand the risks associated with the use of hauled water, as well as the measures that may be employed to mitigate the risks. These risks may be categorized as: (a) risks associated with the source of hauled water; (b) risks associated with the transport of hauled water; and (c) risks associated with potential contamination of hauled water at the property owner's location.

(A) Risks Associated with the Source of Hauled Water

1. *Hauled water may be obtained from unsafe, unmonitored and unapproved sources.* While water haulers are required by the California Department of Public Health to be licensed and obtain water from State-licensed water sources, experience demonstrates that hauled water is often taken from unapproved sources. A recent investigation (2003-2005), conducted by the California Department of Public Health, Food and Drug Branch, revealed that over half of the existing water haulers in the surrounding areas, collected their water from unlicensed sources. Licensed water sources are routinely inspected and tested by the State. Water used from unapproved and unmonitored sources carries significantly higher risks attributed to potential waterborne illness and chemical contamination. It appears that current State regulation in the areas of non-permitted sources and non-compliant haulers may be inadequate.
2. *Risks exist in the transfer of source water to the truck.* Only food-grade connective hoses are approved to fill the hauler's vehicle from the source. Food-grade hoses lower the risk of contamination by micro-organisms. A significant potential for contamination exists when water is transferred from the source to the tanker truck via unapproved connective devices.

3. *Hauled water is a less reliable source than municipal or well water.* Hauled water may be an affordable method for obtaining water at a given time. However, during prolonged periods of drought, where approved water sources may diminish in capacity and the demand continues to increase, water haulers may be the first to be denied source water, and/or prices may become prohibitively high. Hauled water supplies could also be jeopardized as the result of any event that curtails vehicular movement such as earthquakes, fires, flood, and landslide. These kinds of circumstances greatly jeopardize future reliability and quality not only for the initial property owner, but also for the successors and future owners of the property.
4. *Risks associated with the sustainability of hauled water haulers.* A "public water system" within the State and Federal Safe Drinking Water Act is a "system for the provision to the public of water for human consumption, though pipes . . . if such system has at least fifteen service connections . . ." Legal counsel from the Federal EPA have opined that water haulers fall within the definition of public water systems if they serve 15 or more customers. The State, which regulates public water systems, does not currently treat water haulers as "public water systems," but representatives from the State have indicated that they may do so in the future. Many water haulers may have difficulty complying with the strict technical, operational, managerial and financial requirements to which public water systems are held, and they may not be able to stay in the business of providing potable water if the State imposes these regulations. This could make it difficult for people relying on hauled water to obtain hauled water service.

Some of these risks may be mitigated by providing property owners with information on State licensing requirements for the water source, health risks associated with unlicensed water sources, and the potential for contamination if the water is transferred from the source to the hauler's vehicle utilizing unapproved connective devices.

(B) Risks Associated with the Transport of Hauled Water

1. *Water haulers may be unsafe, unmonitored and unapproved.* Water Haulers are required to be licensed by the California Department of Public Health, however not all haulers are licensed. Unlicensed haulers do not consistently meet the prudent safety requirements for proper sanitation and maintenance of water hauling vehicles. Upon full compliance with all State requirements, a Water Hauler may obtain a Water Hauler's License to distribute potable water.

The Water Hauler's License is valid for one calendar year and must be renewed each year by submitting a copy of the most recent coliform test data for the water hauler's vehicle. A licensed hauler must have a current sticker affixed to the upper left quarter of the rear of the vehicle tank that is visible at all times;

2. *Water hauler vehicles may carry health risks.* Frequently water-hauling vehicles carry materials other than potable water. Subsequently these water-haulers fail to recognize the potential for contamination of the future water being delivered to the consumer. The transport tank can present a source of bacterial contamination if not frequently maintained and monitored. A licensed Water Hauler is required to maintain on board the vehicle, records of the dates of cleaning and sanitation (including a description of the process used, cleaning agents and concentration of sanitizing agent); a list of every water source used (including dates, gallonage and the name of the person who authorized the use of the source); delivery points, dates and volumes of water delivered; copies of contracts and licenses; and results of bacterial testing. Not all haulers fulfill these requirements;
3. *Risks exist in the water transfer from truck to storage tank.* Another source of potential contamination exists when the water is transferred from the water hauler's truck to the property owner's water storage tank. Only approved food grade connective hoses may be used to deliver the water from the vehicle to the property owner's storage tank. A backflow prevention device or an air gap must exist between the vehicle's hose and the property owner's storage tank to prevent a cross connection that could potentially contaminate the homeowners storage tank. Additionally, the hauler personnel must also practice good sanitation techniques in the transfer process to further prevent bacterial contamination of the water.

These risks may be mitigated by providing the property owner with adequate information regarding State-licensed potable water haulers; and ensuring that the water hauler is able to provide the necessary documentation (licensing, water sampling test results, and a certificate indicating the State-supplied source) and is aware of and agrees to comply with sound, proven sanitation techniques.

(C) Risks Associated with Potential Contamination of the Hauled Water at the Homeowners' Property

1. *Storage tanks pose risks.* A property owner's storage tank has been found to be a potential source of contamination through the frequent opening and

closing of hatches and transfer pipe openings. Contaminants may enter through poorly constructed and maintained roofs, lids, hatches, vents, and other openings;

2. *Disinfection devices must be used and maintained.* Disinfection devices can be added to the residential plumbing system to eliminate bacterial contaminants. However, these devices, to function effectively, must be monitored and maintained routinely. This may become burdensome to the property owner, jeopardizing the health and safety of the water consumed when the devices are poorly maintained;
3. *Future owners should know the risks.* Upon the sale or ownership transfer of property title, new owners or successors must also be made aware of the risks associated with the use of hauled water existing at the property, as well as the requirements for continued use of bulk hauled water.

These risks may be mitigated by providing the property owner with the requirements for "code-compliant" water storage tank, disinfection device and plumbing connections approved by the Departments of Fire, Public Health and Public Works. The property owner must agree to comply with guidelines regarding the operation and maintenance of the system. Additionally, the property owner would be required to: (1) Acknowledge receipt of recommended methods by which potential risks can be minimized; (2) Acknowledge the potential consequences associated with the use of hauled water, including non-compliance by the water hauler and the possible reduction in the future availability of hauled water due to water shortages or rising costs; and (3) Record a covenant, binding on current and future property owners, agreeing to comply with all requirements relating to procuring hauled water and maintaining equipment, and agreeing to indemnify and hold harmless the County from any claims related to the use of hauled water.

Estimated Cost to Obtain Permit for Hauled Water

Attached are three tables which provide the estimated cost to the owner of a single family residence who wishes to pursue the use of hauled water.

Attachment IV indicates the estimated cost (excluding equipment) for the property owner to satisfy the requirements for obtaining the initial permit for hauled water, approximately \$12,650 to \$16,650.

Attachment V itemizes the one-time estimated costs to obtain a code-compliant 7,500 gallon storage tank and an NSF approved disinfection device (based on a minimum 5,000 gallon capacity tank plus 2,500 gallons required by the Fire Department for a 2,000 square foot house the tank and disinfection device would cost approximately \$10,000 to \$14,000). The applicant will need to contact the Fire Department to determine actual tank size based on the proposed square footage of all structures on the parcel.

Attachment VI outlines the estimated annual recurring cost for the purchase of hauled water, ongoing operation and maintenance and the fee for the annual renewal of the Hauled Water Permit, ranging from \$12,000 to \$13,150.

Next Steps

If your Board determines to direct staff to move forward with changing the County's current policy regarding the use of hauled water, you would need to take the following steps:

- Direct County Counsel, in consultation with other members of the Work Group, to draft an ordinance amending Los Angeles County Code, Title 11 to provide for a single family residential hauled water use policy which incorporate the provisions outlined in this memo, subject to any amendments made by your Board.
- Identify funding and direct the Work Group to develop a work program, outreach plan and estimated timeline for the issuance of an RFP for purposes of retaining a consultant to prepare an environmental impact report (EIR) on the draft single family residential hauled water policy which is in compliance with the California Environmental Quality Act (CEQA) and County CEQA Guidelines. The estimated cost of preparing the EIR is at least \$500,000 and the estimated time to prepare is 18 to 24 months.

WTF:JEF:GF:JS
LS:SS:RM:os

Attachments (6)

c: Executive Officer, Board of Supervisors
Acting County Counsel

Department of Public Health – Environmental Health Division**POSITION ON THE USE OF HAULED WATER FOR DOMESTIC PURPOSES****(07.22.09)**

In Los Angeles County, domestic water is provided to residential lots via municipal water systems or private water wells. The use of "hauled water" is often necessary following an emergency when municipal or private potable water supplies have been interrupted (e.g. fires, earthquakes or other natural disasters). The use of "hauled water" may also provide an alternative source of potable water when private wells go dry or seasonally dry due to drought conditions or changes in groundwater availability. Under the above stated circumstances, and recognizing that there are risks associated with the use of "hauled water", the Department may approve the use of hauled water subject to the following conditions:

- (1) The property owner must contract with a State-licensed potable water hauler;
- (2) The property owner must ensure that the water hauler is able to provide the necessary documentation, certifying that the water was supplied from a State-permitted source;
- (3) Upon the sale of property, transfer of ownership, an addition to the primary structure, or when undergoing any major renovation where the cost of such renovation exceeds 50% of the current replacement cost of the existing structure and requiring a building permit, or within 5 years of the effective date of the Ordinance, the property owner will provide evidence that the property is equipped with a code-compliant storage tank and plumbing connections approved by the Department of Public Works (DPW), and a filtration and disinfection device approved by the Department of Public Health (DPH);
- (4) The property owner must agree to comply with the Department's guidelines regarding the operation and maintenance of the system.

The County is currently considering the use of "hauled water" as a residential water supply for new construction on existing legal lots, or lots that are eligible for a certificate of compliance issued by Regional Planning (excluding lots in those areas that are designated "very high fire hazard severity zones in the Malibu/Santa Monica Mountains and South Face of the San Gabriel Mountains), where the property owner has demonstrated that there is no other feasible, potential source of municipal or onsite well water available to the property. Should the County decide to allow such construction, the role of the Health Officer of the Department is to assure that the water is "potable".

The specific conditions are as follows:

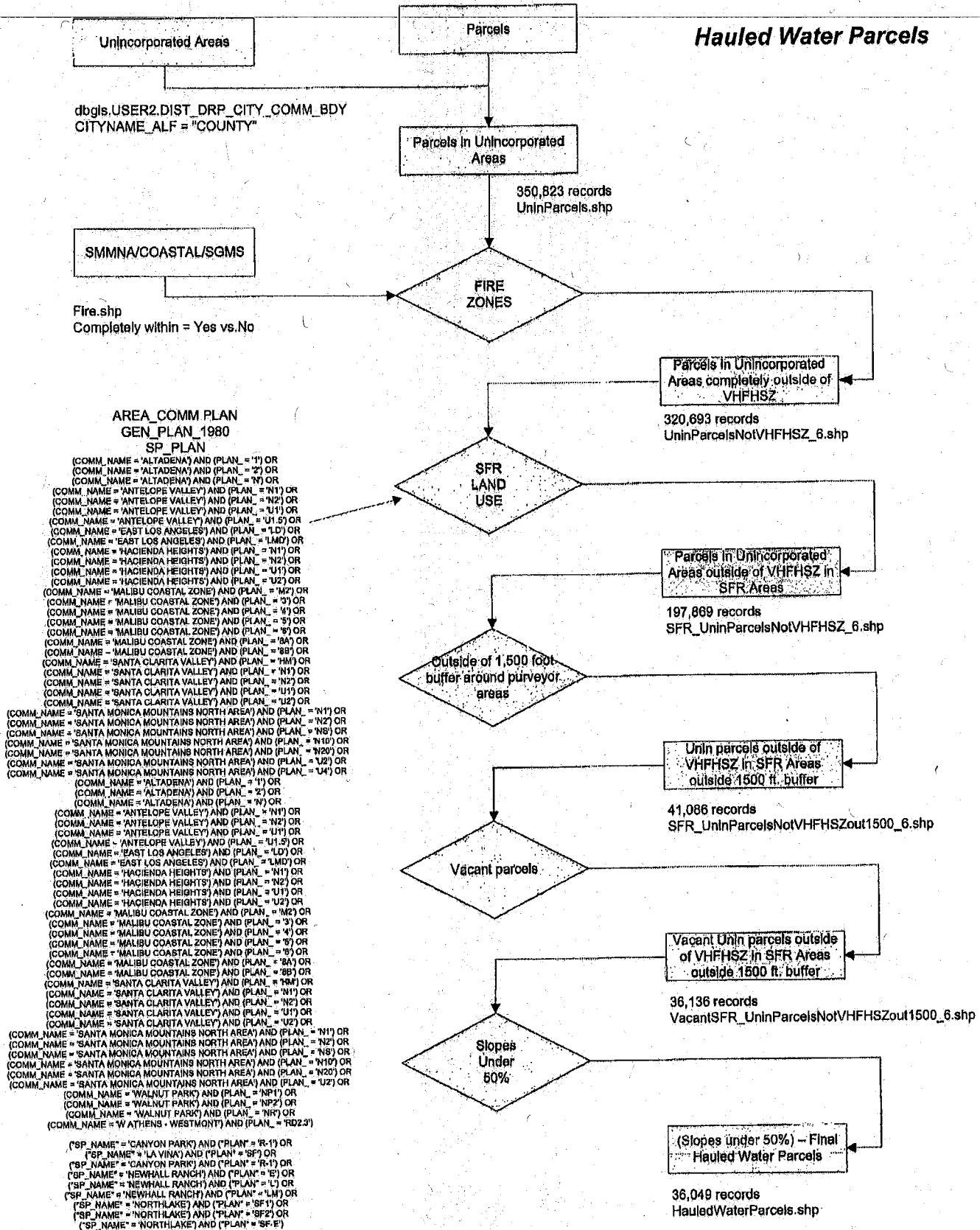
- (1) The property owner must contract with a State-licensed potable water hauler;
- (2) The property owner must ensure that the water hauler is able to provide the necessary documentation, certifying that the water was supplied from a State-permitted source;
- (3) The property must be equipped with a code-compliant storage tank and plumbing connections approved by DPW, and a filtration and disinfection device approved by DPH; and
- (4) The property owner must agree to comply with the Department's guidelines regarding the operation and maintenance of the system.

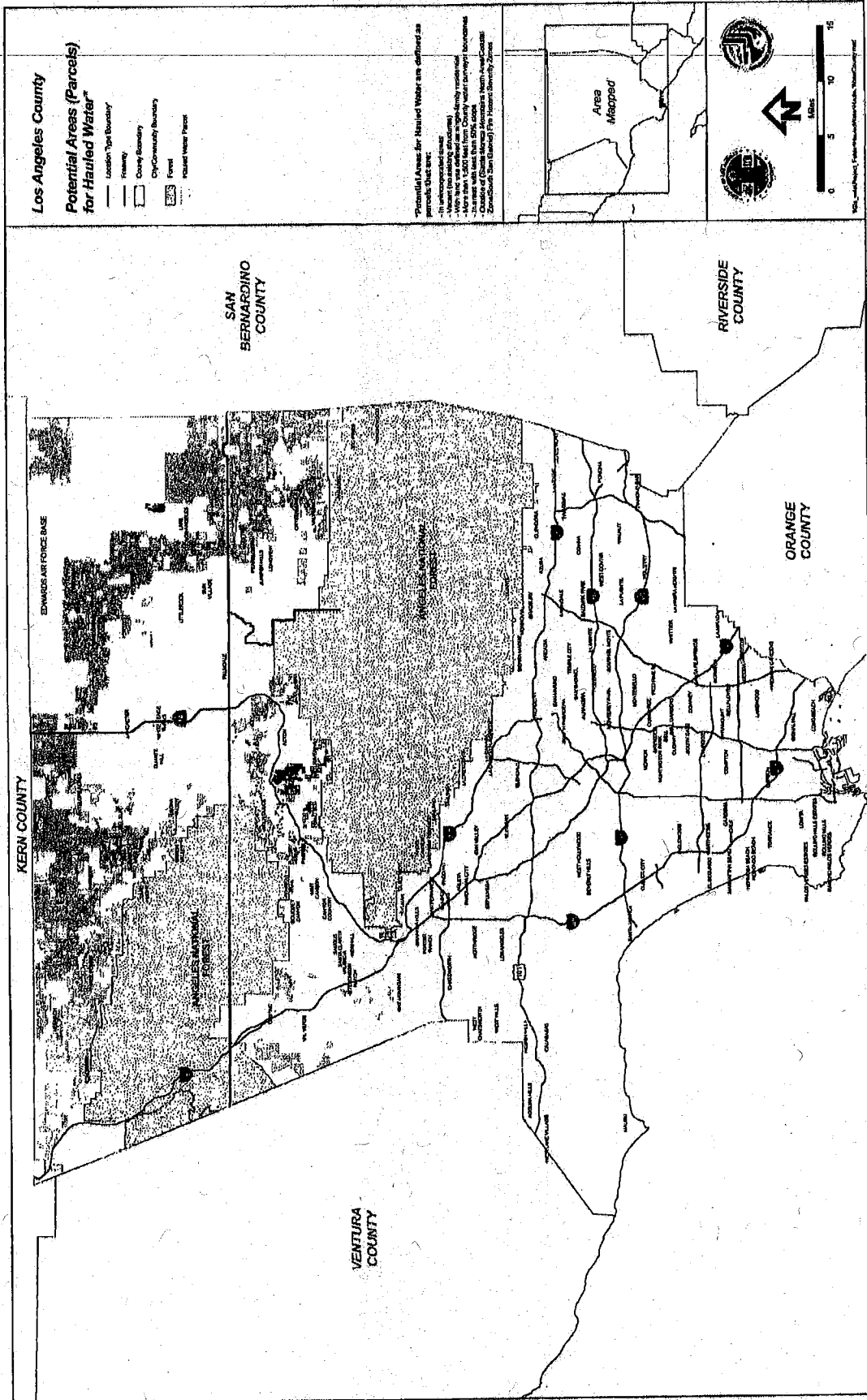
The property owner, in all instances, is required to acknowledge: (1) Receipt of the Department's recommended methods by which potential risks can be minimized; and (2) The potential consequences associated with the use of hauled water, including non-compliance by the water hauler and the possible reduction in the future availability of hauled water due to water shortages or rising costs.¹

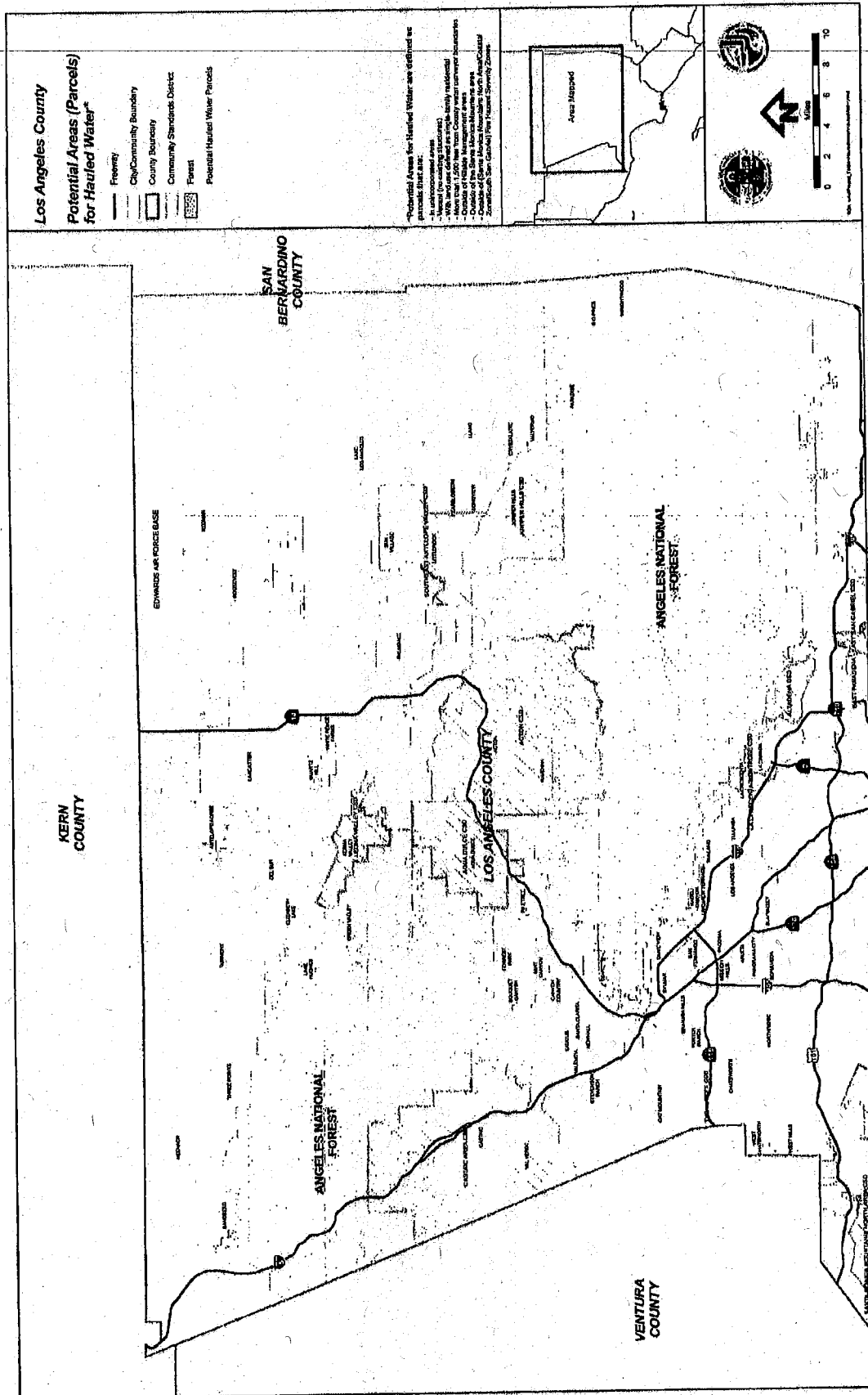
¹ The California Department of Public Health (State DPH) and California Conference of Director of Environmental Health (CCDEH) do not support the use of hauled water as a source of domestic water for new residential development. This position is based on the health risks associated with the process of obtaining, transporting and storing water for domestic use. Letter from State DPH and CCDEH dated February 7, 2003, "Federal Safe Drinking Water Act Amendments Affecting Potable Water."
12-19-08 revised 07-22-09

ATTACHMENT II

Hauled Water Parcels







ATTACHMENT IV

Estimated Cost to Satisfy Requirements to Obtain Hauled Water Permit

The cost for a property owner to satisfy the requirements to obtain a permit for hauled water is estimated to range from \$12,650 to \$16,650. These amounts include the following:

1. Hydrogeological report with recommended location and depth of a test hole (consultant)	\$2,000
2. Plan Preparation for tank and plumbing connections (consultant)	\$1,500
3. Hauled Water Plan Check Fee (Public Health and Public Works)	\$650
4. Drilling costs for 8-5/8" diameter test hole and performing e-log (contractor)	\$8,000 to \$12,000*
5. Annual Hauled Water Permit Fee (Public Health)	<u>\$500</u>

TOTAL \$12,650 to \$16,650

*The cost varies depending on the depth of the test hole.

ATTACHMENT V

Estimated One Time Equipment Cost for a Property Owner

The cost for a property owner to operate a hauled water system would range from \$10,000 to \$14,000. These amounts include the following:

1. Code-compliant storage tank with a 7500 gallon capacity	\$8,500 to \$12,000*
2. NSF approved disinfection device	\$1,500-\$2,000
<hr/>	
TOTAL	\$10,000-\$14,000

*Minimum 5,000 gallon water storage capacity based on public health requirements of 3 gallon/minute plus additional 2500 gallon capacity required for Fire Department for a 2,000 square foot house (NOTE: As the square footage of the home increases, the number of gallons of water to be stored (tank size) to meet the Fire Department requirements also increases).

ATTACHMENT VI

Estimated Annual Operations and Maintenance Cost for Hauled Water

The annual cost for a property owner to operate and maintain a hauled water system is estimated to range from \$12,000 to \$12,650. These amounts include the following:

1. Purchase of Hauled Water	\$10,150*
2. Operation & Maintenance of Code-Compliant Tank	\$1,500-\$2,000
3. Operation & Maintenance of Disinfection Device	\$300-\$500
4. Annual Renewal - Hauled Water Permit	<u>\$500</u>
TOTAL	\$12,000-\$13,150

County Waterworks District No. 37, Acton. For comparison purposes, an equivalent amount of water purchased from Waterworks District No. 37, Acton, would be \$530. Additionally, during prolonged periods of drought, where approved water sources may diminish in capacity and the demand continues to increase, water haulers may be the first to be denied source water, and/or prices may become prohibitively high.

ATTACHMENT II



Response to Public Comments on the Use of Hauled Water

In November 2009, the Los Angeles County Board of Supervisors considered the Chief Executive Office's September 17, 2009, report entitled, *"Report on the Feasibility of Using Hauled Water for New Residential Construction in Select Areas of the County."* The report included a proposed change in the County's current policy on the use of hauled water. The Board directed the County Hauled Water Task Force to conduct community meetings to receive input on the report. The public meetings were held in the communities of Juniper Hills, Lancaster and Acton on June 2nd, 10th and 15th, 2010, respectively to solicit comments on the report. Responses to the comments and questions received during the meetings are categorized below under five headings; *Existing Homeowners Using Hauled Water; Proposed Use of Hauled Water for New Development; State Approved Potable Water Haulers; Miscellaneous; and Process and Timeline for Change in Policy.* Based on the input received from residents at the community outreach meetings in the summer of 2010 as well as further consideration of potential impacts of the use of hauled water, several updates and modifications are now being proposed to the Chief Executive Office's September 17, 2009, report.

Existing Homeowners Using Hauled Water

1. **Will homeowners who are now utilizing hauled water be affected by the proposed "hauled water policy" under consideration by the County Board of Supervisors?**

No. Based on community input, the proposed policy has been revised to apply only to the use of hauled water for new development.

2. **When an existing homeowner proposes to remodel, renovate, or expand their existing home, will they be allowed to continue to use hauled water?**

In the case of a remodel or renovation, a homeowner can continue to utilize hauled water unless a municipal water source has become available. The continued use of hauled water is also permissible in the case of room/home additions which cumulatively increase square footage no more than 50 percent of the home's square footage existing on the date when the County issues a Notice of Preparation for an Environmental Impact Report (EIR) or if no EIR is prepared on the date the County either issues the draft Negative Declaration or Notice of Exemption from the California Environmental Quality Act (CEQA). However, a review by the County Departments of Regional Planning, Public Works, Fire and Public Health will be required to identify any necessary zoning approvals and any necessary increases in water storage capacity or other water system upgrades.

3. **Does an existing homeowner need a "hauled water permit" if hauled water is only used to temporarily or intermittently supplement an onsite well?**

No. Based on input from the communities, the proposal was revised, and no longer applies to existing homeowners utilizing hauled water. The Department does, however, recommend that existing homeowners utilize State certified potable water haulers.



4. **How will the proposed policy affect current homeowners with low-yield wells and/or will the intermittent use of hauled water be allowed to supplement the existing low-yield wells?**

The County recognizes that the use of hauled water is often necessary following an emergency when municipal or private potable water supplies have been interrupted (e.g. fires, earthquakes or other natural disasters) or when private wells go dry or seasonally dry. Under these circumstances, hauled water will be allowed. However, the Department recommends that property owners implement the following measures to mitigate the risks associated with the use of hauled water:

- *The property owner should contract with a State-licensed potable water hauler;*
- *The property should be equipped with a storage tank, plumbing connections and method of disinfection, which have been approved by the Department; and*
- *The property owner is to ensure proper operation and maintenance of the system.*

5. **Will the proposed policy affect the continued use of hauled water for an existing property upon sale of property or transfer of ownership?**

No, the sale or transfer of property ownership will not trigger any new requirements under the proposed hauled water policy. However the existing tank and water system remain subject to any applicable rules, regulations, ordinances, or laws in affect at time of transfer.

6. **What will happen to existing users of hauled water in the event of a fire or other natural disaster?**

Please see response to question #4.

Proposed Use of Hauled Water for New Development

7. **What are the specific requirements that will be imposed upon a property owner who wishes to utilize hauled water for new development?**

The property owner is required to demonstrate that there is no feasible, potential source of municipal or onsite well water available to the property. In order to ensure hauled water is potable in such cases, the Health Officer has specified the following conditions:

- *The property owner must contract with a State-licensed potable water hauler;*
- *The property must be equipped with a storage tank, plumbing connections and method of disinfection, which have been approved by the Department;*
- *The property owner acknowledges receipt of the Department's recommended methods to minimize the risks associated with the use of hauled water, and the possible reduction in the future availability of hauled water due to water shortages or rising costs, and agrees to comply with the Department's requirement for operation and maintenance of the system; and*
- *The property owner must record a Covenant to ensure that any future owners, encumbrances, their successors, heirs or assignees are aware that hauled water is the primary source of potable water for the property.*



8. **The proposed policy indicates that hauled water will only be permitted if "no on-site potable water is available". Could hauled water be used to supplement a low yield well in support of new development? How will this determination be made?**

First, the property owner must provide evidence that the subject property does not lie within the service boundaries of a municipal water district and/or a public/community water purveyor, as of the date when the County issues a Notice of Preparation for an EIR or if no EIR is prepared on the date the County either issues the draft Negative Declaration or Notice of Exemption from the CEQA. The applicant must also demonstrate that a good faith effort has been made to determine that insufficient ground water / well water is available, which may include: a report from a hydrologist, hydro geologist or other State-registered earth science professional indicating the subject property does not have ground water available; OR submit other evidence to the Health Officer for approval confirming that water is not available on the subject property.

When it is determined that insufficient onsite water is available; OR the well yield does not provide a minimum of 3 gallons per minute or 2 gallons per minute with the construction of a 1500 gallon storage tank; AND when the property lies outside of the boundaries of a municipal water district and/or public/community water purveyor, the property owner may be approved to use hauled water to supplement the low yield well for the purpose of obtaining a building permit. If the well meets the yield threshold, property owners will be required to use well water as the sole source of potable water.

9. **Can you explain what constitutes the "Fire Hazard Area" and will the pending State legislation that requires sprinklers for all new construction affect the use of hauled water?**

The prohibition on the use of hauled water for new development in the most problematic high fire severity zones where sprinklers are required, based on that criterion alone, has been removed from the revised Report. Accordingly, the new State legislation that requires sprinklers for all new construction, regardless of whether the new construction is located in a high fire severity zone, has no bearing on the potential use of hauled water in the revised Report.

10. **What constitutes an "approved tank"? Is the storage tank and disinfection device required to be National Sanitation Foundation (NSF) approved or simply meet NSF or equivalent standard?**

For new development, the use of hauled water would require the use of a water storage tank that meets the requirements of the Los Angeles County Health and Safety Code, section 11.38.370. (see addendum). The water volume requirements of Public Health and Fire must also be met in order for the water storage tank to be approved. Disinfection devices will be required to meet NSF and American National Standards Institute (ANSI) standards (see question 12 for more details on disinfection equipment requirements).

11. **Would you accept an NSF approved coating on the inside of tanks?**



Hauled water storage tanks will not be required to have an NSF approved interior coating, but the Department of Public Health will accept tanks with such coatings if the tanks meet the requirements of the Los Angeles County Health and Safety Code, section 11.38.370 (see addendum for question 10).

12. What disinfection methods will be approved for use with hauled water?

There are various technologies available for disinfection of hauled water that is stored in a residential water storage tank. The Department is willing to evaluate and consider most proposed disinfection methods. Departmental approval will be based on compliance with the established NSF/ANSI standards and the requirement that the water produced by the disinfection system meets the biological requirements of the California Code of Regulations, Title 22, which requires drinking water to be free of total coliform bacteria. (see addendum). Examples of water disinfection technologies are: ultra-violet disinfection, chlorination, the use of bromine, reverse osmosis, or a combination thereof.

13. What would be required in the "Covenant" to be recorded on a property using hauled water?

The covenant would include the following terms: Owner acknowledges that proper operation and maintenance of the disinfection system is essential to ensuring the potability of the stored water; owner relinquishes any right to future subdivision of the property as long as hauled water is the only source of water to the property; owner agrees to obtain hauled water from a licensed potable water hauler; owner acknowledges that hauled water may not be available in the future; owner agrees to connect to a municipal water system if or when a connection to that system becomes available, as long as making the connection is reasonable under the circumstances and can be accomplished without undue expense; and owner assumes all risks arising from or connected with the use of hauled water on the property and shall hold the County harmless for any claims for damages arising from or connected with the use of hauled water at this property.

14. Will the process of recording a covenant for the use of hauled water require an extended period of time? Past experience of homeowners in obtaining a shared well approval required two years.

No. The hauled water covenant will consist of standard terms, generally prepared in advance. The covenant will be recorded with the Registrar-Recorder/County by the property owner upon acceptance.

15. What are the estimated costs to property owners, if they wish to utilize hauled water for new development on existing lots? (Include lab sampling costs).

It is estimated that a homeowner wishing to utilize hauled water for new development may incur initial start up costs between \$8,000 and \$30,000, depending on the extent of geological assessment or if drilling is required. These costs could be considerably higher. Annual maintenance costs are estimated at \$300 to \$500. This estimate does not include the ongoing cost of purchasing hauled water.



16. How many test holes must be drilled on a property to demonstrate there is no source of onsite water available? Would the Department be willing to put a cap on the total cost incurred by the homeowner?

The Department does not require a minimum number of test holes to be drilled on a residential lot for the purpose of determining that sufficient ground water is not available. The applicant must also demonstrate that a good faith effort has been made to determine that sufficient ground water / well water is not available, which may include: a report from a hydrologist, hydro geologist or other State-registered earth science professional indicating the subject property does not have ground water available; OR submit other evidence to the health officer for approval confirming that sufficient water is not available on the subject property.

17. Will fines be imposed on property owners who do not "file routine water quality sampling results" with the health department?

No. Based upon input from the community a property owner utilizing hauled water for new development will only be required to submit an initial water test upon installation of the disinfection system and water tank.

18. If a property falls within the service area of a public or private community water system, is the use of hauled water precluded?

Yes. All properties located within the service area/boundaries of a municipal water district and/or a public/community water purveyor, as of the date when the County issues a Notice of Preparation for an EIR or if no EIR is prepared on the date the County either issues the draft Negative Declaration or Notice of Exemption from CEQA are required to obtain water directly from them.

19. Does the use of hauled water represent a significant health risk that warrants the County's imposition of the proposed requirements?

The risks associated with the use of hauled water could be significant and, include the potential that the source water might be contaminated, or that the water may become contaminated during pickup, transportation, delivery or onsite storage. These risks are discussed in detail in the "Report on Feasibility of Using Hauled Water for New Residential Construction in Select Areas of the County" dated September 17, 2009.

20. Isn't a \$500 annual permit for using hauled water excessive?

Based on input from the community meetings, the proposed annual permit for users of hauled water has been deleted.

21. Does the County have a minimum required size for water storage tanks on property where hauled water is used?

Currently, Fire Department has a requirement of 2,500 gallons for a 2,000 square foot house. The tank size will increase as the size of the house increases.

In the County's proposal for new development, the minimum water storage tank capacity for a 2,000 square foot house would be 7,500 gallons (5,000 gallons required by Public



Health and 2,500 gallons required by Fire). As the square footage of the house increases, the tank size will also increase. Public Works/Public Health will be willing to discuss it's requirement with the Technical Advisory Committee.

The only requirement that the Fire Department oversees related to the use of hauled water is when residential fire sprinklers are chosen as an alternate means of fire protection. When using hauled water to supply residential fire sprinklers an additional 500 gallons shall be added to the stored water requirements.

- 22. Why would it be necessary to disinfect all the hauled water that is delivered in lieu of only the water that is to be consumed? Why would we have to disinfect the water used for outdoor use?**

Only water entering the house requires disinfection. Water for irrigation does not need to be disinfected.

- 23. Why are the estimated fees for hauled water utilization and approval so high? Are these fee schedules going to be modified?**

Currently the County has not established a schedule of fees associated with the use of hauled water. Any such fees would be submitted to the Board of Supervisors for consideration and approval prior to becoming effective.

- 24. Why would an adjacent property to mine be evaluated to establish the absence of water on my property?**

Property owners are not required to utilize information from adjacent properties, although the Department is willing to consider such information when provided by an applicant.

- 25. What if a municipal water company were located 2 miles from my home? Would I be required to connect even if the costs were prohibitive?**

If the property is located outside the service boundaries of a municipal water district and/or public/water purveyor, the property owner is not required to connect to the water system. However, if the property is located within the service boundaries of an existing municipal water district and/or public/water purveyor, as of the date when the County issues a Notice of Preparation for an EIR or if no EIR is prepared on the date the County either issues the draft Negative Declaration or Notice of Exemption from CEQA the property owner will not be eligible to use hauled water as a source of potable water for new development.

- 26. Why couldn't hauled water be used for new subdivisions if we are willing to accept hauled water for existing subdivisions?**

The proposal is for new development of a single-family residence on an existing legal lot. The purpose for allowing the use of hauled water would be to make it possible for a property owner to build and live in a home on their property; subdivisions are a commercial venture not appropriately supported through allowing the use of hauled water.



27. **Why does the County insist upon a disinfection method? (Some members of the communities do not want to add chemicals to the water).**

Dysentery, cholera and pathogenic coliform, for example, have contributed to high mortality rates for users of non-disinfected water. Human longevity has greatly increased through the use of disinfection for drinking water. Please note that the use of ultraviolet treatment and other non-chemical disinfection methods may provide adequate protection without introducing chemicals to the drinking water.

28. **If a covenant were recorded against the property for the use of hauled water, and the property owner subsequently drilled a well and found water, what happens to the covenant?**

If the covenant is no longer necessary due to development of an onsite well, it can be expunged from the record.

29. **Are developers precluded from using hauled water for dust-control during construction activity?**

No. Hauled water for dust control is allowable.

State-Approved Potable Water Haulers

30. **What constitutes a State Approved Potable Water Hauler?**

The California Health and Safety Code Section 111120 (see addendum) requires that a water hauler obtain a license issued by the California Department of Public Health – Food and Drug Branch (CDPH) to haul water in bulk for drinking, culinary or other purposes involving the likelihood of being ingested by humans. A State Approved Water Hauler is subject to strict requirements including: water may only be obtained from a licensed private source; must comply with all equipment standards; must comply with all truck labeling requirements; water must be sampled and analyzed for organic and/or inorganic chemicals by a laboratory certified by CDPH, EPA or other lab acceptable to the Department; the sampled test results must be provided to CDPH at least once every thirty days during months when water is being hauled; and a log must be kept on the hauler's vehicle indicating dates of cleaning, water sources used, delivery points, copies of licenses and water sample test results.

31. **How can I find a State Approved Potable Water Hauler?**

Contact the CDPH - Food and Drug Branch - Food Safety Inspection Unit for the Southern Region for a complete listing of the licensed water haulers in your area:

*605 West Santa Ana Blvd.
Building 28, Room 324
Santa Ana, CA 92701
Phone: (714) 558-4595; Fax: (916) 440-5817
Email: Jane.Reick@cdph.ca.gov*



32. **The County has referred to non-compliance amongst water haulers based on a study in San Bernardino. Why doesn't the County consider the current rate of compliance amongst water haulers within Los Angeles County?**

The study in San Bernardino was conducted by the California Department of Public Health - Food and Drug Branch as they regulate both the water source and water haulers in the State including Los Angeles County. This is the only study currently available on compliance rates amongst the potable water haulers in California.

33. **Is there a State or local agency that currently regulates water haulers?**

The California Department of Public Health Food and Drug Branch pursuant to California Health and Safety Code 111120 (see addendum for question 30) provides a license for approved water haulers to haul water in bulk that is to be used for drinking, culinary, or other purposes involving a likelihood of the water being ingested by humans.

34. **Will the County be liable for problematic hauled water?**

As proposed, the hauled water policy includes a requirement that any user of hauled water accept all potential liability associated with the use of hauled water, and indemnify the County in the event that the County is sued due to allowing hauled water to be used by the property owner. These liability and indemnification requirements will be included in the required Covenant.

35. **Why isn't the prohibition against hauled water focused on illegal haulers instead of on the water itself?**

Current State regulations do not allow non-conforming haulers.

Miscellaneous

36. **What led to the County's change in policy during the period 2001-2003 regarding the use of hauled water?**

Effective January 1, 2003 the Los Angeles County Department of Public Health, developed "Water Availability Requirements" for residential and commercial development. This document effectively precluded the use of hauled water for new development and was in response to an advisory from the CDPH to all local building and planning agencies indicating that the State does not "... support the use of hauled water as a source of domestic water for new residential development".

37. **Will the County consider ways to minimize costs to homeowners while at the same time ensure that development associated with the use of hauled water is ecologically friendly?**

The County is considering how to minimize the risk associated with the use of hauled water without unnecessary cost to the homeowner. Any decision by the Board of Supervisors to approve the use of hauled water for new development would require a thorough review of the potential ecological / environmental impacts.



38. **Would the current proposal allow a builder to install one large water tank for the purpose of hauled water serving a group of homes on adjoining legal lots?**

No. The proposal is for single legal lots and does not allow for the sharing of tanks amongst neighboring parcels.

39. **What does the Department mean by the term "sustainable water supply"?**

When the Department uses this term "sustainable water supply", it is referring to an "adequate supply of potable running water" as referenced in the Los Angeles County Code – Title 28, Section 601.1 (see addendum).

40. **Does a proposed subdivision establishing parcels of 5 acres or greater require water or wastewater approval from the Department of Public Health?**

No. Water and wastewater approval from the County is not required for the establishment of subdivisions involving lots which are 5 acres or greater in size. However, upon completion of the sub-division, a property owner would be required to obtain water availability approval from the Department of Public Health before issuance of a building permit.

41. **If hauled water can be a safe alternative in certain situations, why can't its use be approved whenever it is requested by the property owner?**

The Task Force has indicated there is a risk in utilizing hauled water, including quality and sustainability of source water as well as a potential for contamination during pickup, transportation and delivery and onsite storage. However in the proposal, property owners who wish to utilize hauled water for new development are subject to specified conditions to minimize the risk including: contract with State-licensed-water hauler; utilize approved storage and disinfection system; and record a covenant to ensure that current/future owners are aware of requirements for continued safe use.

42. **Will the County be developing engineering geological requirements?**

No. The local availability of groundwater can vary significantly from site to site. Therefore, the determination of the availability of groundwater requires a site-specific investigation. The County would accept an independent assessment by a licensed professional.

43. **Will the County accept sonar testing (or the use of a "sounder") as an adequate demonstration of the absence of water on a property?**

The County will evaluate all methods utilized by a licensed professional in the determination of water availability.

44. **Is the County willing to reduce its minimum production yield requirement of 3 gallons per minute? Can the required yield be related to "number of fixtures"?**

The Department will confer with its Technical Advisory Committee on these questions.



45. **Is it possible that banks may be reluctant to finance improvements on a lot where hauled water is to be utilized? Would the use of hauled water also affect insurability of a property?**

It is uncertain how banks would react to the financing of improvements at locations where hauled water is utilized; however, homeowners who have water approval could build if they provide their own funds.

It is unknown how the use of hauled water would affect the insurability of a property; however, in addition to the hauled water policy, additional water storage for fire suppression would be required.

46. **Will the County Assessor's Office reduce the assessed value of a parcel of land that has neither a source of onsite water nor the option of utilizing hauled water?**

For single-family residences, the Assessor typically uses the purchase price to establish the base year for property tax purposes. Thus, if the use of hauled water affects a property's fair market value, it will likely affect its purchase price. This will then have an impact on the Assessor's assessed value for the property.

47. **Has the County received any reports of illnesses that have been confirmed as being associated with hauled water?**

There have been no reports of illness specifically associated with the use of hauled water.

48. **Why can't we just elect to use hauled water without proving anything?**

In order to obtain a building permit for construction County Code requires the property owner to demonstrate an approve source of potable water which currently is either through a municipal source or onsite well water.

49. **Do you approve the findings of a "witcher"?**

No. Although it is possible for someone to have a common knowledge approach in finding water, all water decisions must be based on technically documented data.

50. **Why does the County feel the need to be national "leaders"?**

The County is not looking to be a "national leader" in the area of hauled water. The County is addressing this issue in a manner that protects public health and safety.

51. **When ground water is found to contain unacceptable levels of arsenic, could hauled water be used to replace the contaminated well water?**

There are technologies for mitigation of arsenic along with other strategies which must first be considered.

52. **What is the definition of a "legal lot"?**

A "legal lot" is a lot that, at the time of its creation, was legally created under the California Subdivision Map Act, Section 66410, et seq. of the California Government Code.



53. What is the definition of a "subdivision"?

A "subdivision" is the division of land into two or more legal lots in accordance with the California Subdivision Map Act, Section 66410, et seq. of the California Government Code.

Process and Timeline for Proposed Change in Policy

54. Following the community meetings, what are the next steps?

Upon conclusion of all community meetings, the comments received will be considered and a "Response to Comments" will be prepared and distributed to the communities. In addition, based on the comments and further analysis by County staff, the proposal will be revised and submitted to the Board of Supervisors for consideration.

55. When will the revised recommendations for the use of hauled water be resubmitted to the Board of Supervisors for further consideration?

The Hauled Water Task Force considered all comments received from the public following the last community meeting on June 15, 2010, and prepared this "Response to Comments". The Task Force is presently preparing a report to the Board of Supervisors with revised recommendations. It is expected that this report will be submitted to the Board of Supervisors in the first or second quarter of 2012.

56. Will the proposed recommendations require adoption of a new ordinance or amendment of an existing County code?

The proposed recommendations will likely be achieved through adoption of an ordinance, and would likely be incorporated into one of the County Code's Health and Safety Titles. It would not likely be incorporated into either Title 21 or 22 dealing with zoning and land use.

57. Is there an e-mail address where questions and comments on the proposed hauled water report may be directed?

Yes, direct your e-mail to the attention of Richard Lavin, Chief of the Drinking Water Program, at: waterquality@ph.lacounty.gov

58. If the proposed hauled water recommendations are accepted by the Board of Supervisors, when would they likely to take effect?

If the Board of Supervisors accepts the recommendations and elects to move forward with the use of hauled water, an EIR may be required under CEQA. The EIR process usually takes 18 to 24 months to complete. Upon completion of the EIR, an ordinance would likely be required. A drafted ordinance would also require submission and adoption by the Board of Supervisors. Upon adoption of the ordinance, the hauled water policy could be implemented.

59. Before the proposed recommendations are resubmitted to the Board of Supervisors, will the communities be provided with answers to the questions



raised, as well as the revised "Report on the Feasibility...." and any recommended changes based on input from community meetings?

The Task Force will combine all of the questions/comments received as well as responses to those comments, in this written "Response to Comments" document. The revised report will be made available/distributed to the communities at the same time it is sent to the Board of Supervisors for its consideration.

60. **Will an Environmental Impact Report pursuant to the California Environmental Quality Act (CEQA) be required in order to adopt the proposed policy on the use of hauled water for new development on existing legal lots?**

Since the revision of the proposed policy has only just concluded, at this time neither an assessment of CEQA exemption nor an Initial Study as required under CEQA to determine whether there may be any significant adverse environmental impacts from the adoption of the proposed policy have been conducted. .

61. **Does the County have the authority to enforce regulations for hauled water or even well water since the Plumbing Code only requires potable water on the property?**

Yes, under the California Constitution, the County has the police power authority to adopt health and safety ordinances and regulations, and also to enforce such ordinance and regulations. This authority would include the power to adopt an ordinance and/or regulations regarding the use of hauled water in the unincorporated areas of the County.

LA County Code, Title 28, Plumbing, Section 100 adopts the California Plumbing Code each time it is updated. Section 218.0 of this code defines potable water as: "water which is satisfactory for drinking, culinary, and domestic purposes and meets the requirements of the Health Authority having jurisdiction". Currently the Health Officer recognizes municipal or public water and onsite well water as approved water sources.

LA County Code, Title 11, Health and Safety, Section 11.38.165 indicates: "When the well yield test has been completed to the satisfaction of the Director and documentation of laboratory analysis showing that the water quality meets the primary bacteriological and chemical requirements of the Safe Drinking Standards, is provided to the Department, a water availability approval shall be issued by the Director for the purpose of obtaining a building permit"; Section 11.38.270 indicates "No well water from a new or reconstructed well shall be used for domestic purposes until the water meets such bacteriological and chemical requirements".



Response to Public Comments on the Use of Hauled Water ADDENDUM

The following code sections are mentioned in this document and referenced by the corresponding numbered question. Each code section is followed by a summary statement that is provided in **bold font** to explain the essential requirement of the code section as it relates to hauled water.

10. Los Angeles County Health and Safety Code

11.38.370 Domestic water--Reservoirs and tanks--Protection from contamination.

A. Durable protection and substantial covers shall be provided and maintained for each reservoir, tank, cistern, standpipe or other structure used for distribution or storage of domestic water. Covers shall be watertight, and shall be constructed so as to provide drainage away from the structure. All openings for ventilation shall be screened with corrosion-resistant screen not coarser than one-fourth-inch mesh to exclude rodents and birds, or with 16-mesh screen when such screen is necessary to control mosquito or insect breeding in such reservoir. All manholes shall be constructed with curbs raised above the surrounding surface, and installed in a manner to prevent roof or surface drainage from entering the structure. When it is determined by the director that it is impractical, due to size, shape or other unusual conditions, to provide and maintain a cover as provided for in this section, adequate treatment and protection of the water shall be provided as required and approved by the director.

B. Any reservoir, standpipe, cistern, forebay, tank, weir box, receptacle, or any other form of installation used for the production, distribution or storage of any domestic water supply or water used for human consumption, shall be securely protected against pollution or contamination. (Ord. 9375 § 1 (part), 1967; Ord. 7583 Part 3 Ch. 5 § 514, 1959.)

Summary: This code section explains the structural requirements for the water storage tanks at the residence to protect the stored water from contamination.

12. California Code of Regulations, Title 22, Division 4 (Environmental Health), Chapter 14 (Water Permits), Article 3 (State Small Water Systems), Section 64212 (Bacteriological Quality Monitoring):

§64212. Bacteriological Quality Monitoring.

(a) Each water supplier operating a state small water system shall collect a minimum of one routine sample from the distribution system at least once every three months. The sample shall be analyzed for the presence of total coliform bacteria by a laboratory certified by the Department for bacteriological analyses pursuant to Section 4025¹ of the



Health and Safety Code. The results of the analyses shall be reported to the local health officer no later than the 10th day of the month following receipt of the results by the state small water system.

(b) If any routine sample is total coliform-positive, the water supplier shall collect a repeat sample from the same location within 48 hours of being notified of the positive result. If the repeat sample is also total coliform-positive, the sample shall also be analyzed for the presence of fecal coliforms or *Escherichia coli* (E. Coli). The water supplier shall notify the local health officer within 48 hours from the time the results are received and shall take corrective actions as directed by the local health officer to eliminate the cause of the positive samples.

(1) Section 4025 has been recodified to 116390 as follows:

(a) No laboratory, other than a laboratory operated by the department, shall perform tests required pursuant to this chapter for any public water system without first obtaining a certificate issued by the department pursuant to Article 3 (commencing with Section 100825) of Chapter 4 of Part 1 of Division 101.

(b) No person or public entity of the state shall contract with a laboratory for environmental analyses for which the state department requires certification pursuant to this section, unless the laboratory holds a valid certificate.

Summary: This code section is cited as one example (of which there are many in the California Health and Safety Code) that requires the absence of total coliform bacteria in drinking water. Section 116390 requires that the total coliform analysis of the drinking water sample be performed by a state certified laboratory. The disinfection system at the water storage tank or at the point of entry into the hauled water residence will be required to provide water that is free of total coliform bacteria. Private wells have the same total coliform free requirement.

30. California Health and Safety Code

§111120. Requirement for Obtaining a Water Hauler License.

(c) It shall be unlawful for any person to bottle, collect, treat, hold, distribute, haul, vend, or sell bottled water, vended water, operate a retail water facility, or operate a private water source without the license as required by this article. Any bottled water or vended water dispensed by a retail water facility or a private water source that is not licensed in compliance with this article is misbranded and may be embargoed pursuant to subdivision (e) of Section 111120.

Summary: This code section states the requirement that a water hauler be licensed by the State of California. The procedure to obtain a water hauler license from the California Food and Drug Branch can be found at:

<http://www.cdph.ca.gov/pubsforms/Documents/fdbBVWgde07.pdf>



39. Los Angeles County Health and Safety Code

Title 28, Plumbing Code, Chapter 6, 601.1, Water Supply and Distribution

Except where not deemed necessary for safety or sanitation by the Authority Having Jurisdiction, each plumbing fixture shall be provided with an adequate supply of potable running water piped thereto in an approved manner, so arranged as to flush and keep it in a clean and sanitary condition without danger of backflow or cross-connection. Water closets and urinals shall be flushed by means of an approved flush tank or flushometer valve.

Summary: A sustainable water supply is one that is also adequate enough to supply potable water to plumbing fixtures in a manner that keeps them clean and sanitary.

ATTACHMENT III

Department of Public Health - Environmental Health Division

POSITION ON THE USE OF HAULED WATER FOR DOMESTIC PURPOSES

July 2012

USE OF HAULED WATER FOR EMERGENCIES OR WHEN WELLS GO DRY

In Los Angeles County, domestic water is normally provided to residential lots via municipal water systems or private water wells. However, the use of "hauled water" is often necessary following an emergency when municipal or private potable water supplies have been interrupted (e.g. fires, earthquakes or other natural disasters); or when private wells go dry or seasonally dry due to drought conditions or changes in groundwater availability. Under these stated circumstances, the Los Angeles County Department of Public Health (Department) advises property owners that the risks associated with the use of hauled water can be mitigated by the following actions:

- 1) The property owner should contract with a State-licensed potable water hauler;
- 2) The property should be equipped with a storage tank, plumbing connections and method of disinfection, which have been approved by the Department; and
- 3) The property owner is to ensure proper operation and maintenance of the system.

USE OF HAULED WATER AS A POTENTIAL SOURCE OF WATER FOR NEW DEVELOPMENT

The County is currently considering the use of "hauled water" as a residential water supply for new construction on existing legal lots, or lots that are eligible for a certificate of compliance issued by Regional Planning (excluding lots in those areas that are designated "very high fire hazard severity zones" in the Malibu/Santa Monica Mountains and South Face of the San Gabriel Mountains), where the property owner has demonstrated that there is no other feasible, potential source of municipal or onsite well water available to the property. Should the County decide to allow such construction, the role of the Health Officer of the Department is to assure that the water is "potable". The specific conditions to meet this assurance are as follows:

- 1) The property owner must contract with a State-licensed potable water hauler;
- 2) The property must be equipped with a storage tank, plumbing connections and method of disinfection, which have been approved by the Department;
- 3) The property owner acknowledges receipt of the Department's recommended methods to minimize the risks associated with the use of hauled water, and the possible reduction in the future availability of hauled water due to water shortages or rising costs,¹ and agrees to comply with the Department's requirement for operation and maintenance of the system; and
- 4) The property owner must record a Covenant to ensure that any future owners, encumbrances, their successors, heirs or assignees are aware that hauled water is the primary source of potable water for the property.

¹ The California Department of Public Health (State DPH) and California Conference of Director of Environmental Health (CCDEH) do not support the use of hauled water as a source of domestic water for new residential development. This position is based on the health risks associated with the process of obtaining, transporting and storing water for domestic use. Letter from State DPH and CCDEH dated February 7, 2003, "Federal Safe Drinking Water Act Amendments Affecting Potable Water."